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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/608,135	06/30/2000	Jan-Dieter Spalink	FOV0001-US.	9698
26108 7590 01/08/2008 DANIELS DANIELS & VERDONIK, P.A. SUITE 200 GENERATION PLAZA 1822 N.C. HIGHWAY 54 EAST DURHAM, NC 27713			EXAMINER DINH, MINH	
			ART UNIT 2132	PAPER NUMBER
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**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	<b>Application No.</b> 09/608,135	<b>Applicant(s)</b> SPALINK ET AL.	
	<b>Examiner</b> Minh Dinh	<b>Art Unit</b> 2132	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 18 October 2007.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-13 and 28-31 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-13 and 28-31 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                       | 5) <input type="checkbox"/> Notice of Informal Patent Application                       |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

**DETAILED ACTION**

***Response to Amendment***

1. This action is in response to the RCE/amendment filed 10/18/2007.  
Claim 1 has been amended; claims 28-31 have been added.

***Response to Arguments***

2. Applicant's arguments filed 10/18/2007 have been fully considered but they are not persuasive.

With respect to claim 1, Applicant argues that the network service provider disclosed by Rupp et al. ("INDEX: A Platform for Determining how People Value the Quality of their Internet Access") is not an internet service provider in the context of an ISP as described and understood from Applicant's Specification (page 7, second to last paragraph). Although the claims are interpreted in light of the specification, limitations from the specification are not read into the claims. Rupp's network service provider is an ISP (Internet Service Provider) because it provides users with access to the Internet (fig. 1).

With respect to the new claim 31, Applicant argues that the claim is similar to claim 1 but is recited as "consisting substantially of" the steps of claim 1 thereby precluding and distinguishing over the teachings of Rupp which requires a Control Center application in cooperation with a supervisor

and a Billing Gateway to implement the system (page 8, first paragraph).

Since the scope of the phrase "consisting substantially of" has not been defined in the specification, i.e., Applicant has not made clear in the specification what is regarded as constituting a material change in the basis and novel characteristics of the invention, the phrase will be construed as equivalent to "comprising" for prior art rejection purpose (see MPEP § 2111.03).

***Claim Rejections - 35 USC § 103***

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 1, 4-5, 28-29 and 31 are rejected under 35 U.S.C. 103(a) as being unpatentable over Rupp et al. ("INDEX: A Platform for Determining how People Value the Quality of their Internet Access") in view of Gabber et al (5,961,593) and Carr et al (5,835,915).

Regarding claims 1 and 31, Rupp discloses a method comprising: obtaining an identifier representing one or more users of a computer network at a network service provider, i.e., a supervisor node which

determines who has access to which service (section 2.1, second paragraph); creating an anonymized identifier associated with the obtained identifier; collecting data being transmitted across the computer network at a collection engine (i.e., a billing gateway) connected to the network service provider; associating the anonymized identifier with the collected data if the collected data is sent to or from the one or more users to create a transaction record; and storing the transaction record in a database at the network service provider (fig. 1; section 2.1; section 2.2, third paragraph).

Rupp discloses that an anonymized identifier associated with the obtained identifier is created; however, Rupp does not disclose how the anonymized identifier is created. Gabber discloses creating an anonymized identifier using an obtained identifier (see Abstract). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the Rupp method such that the anonymized identifier is created using the obtained identifier, as taught by Gabber, so that the same user will be recognized by a consistent anonymized identifier (Abstract).

Rupp discloses that the transaction record is stored in a database at the network service provider; however, Rupp does not disclose that the transaction record is stored in a database separate from the network service provider. Carr discloses that transaction records are stored in a database at a primary system and also in a duplicate database in a remote backup

system separate from the primary system (col. 1, lines 16-60). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the Rupp method such that the transaction record is stored in a database in a remote backup system separate from the network service provider in addition to the database at the network service provider, as taught by Carr. Widespread disaster over a large geographic area that adversely affects the primary system will not affect the remote backup system (col. 1, lines 50-54).

Regarding claims 4 and 5, Gabber further discloses that that the anonymized identifier is created by applying a one-way hashing function to the obtained identifier and a value, which meets the limitation of a security key (col. 9, lines 9 and 23-24). It would have been obvious to one of ordinary skill in the art at the time the invention was made to further modify the method of Rupp such that the anonymized identifier is created by applying a one-way hashing function to the obtained identifier and a security key, as taught by Gabber. Please refer to motivation recited for creating the anonymized identifier using the obtained identifier as taught by Gabber in claim 1.

Regarding claim 28, Rupp further discloses that the collection engine is a passive device that monitors network traffic, collects data and records the collected data in a database (section 2.1; section 2.2, third paragraph).

Regarding claim 29, Rupp further discloses creating online behavioral profiles (i.e., measurement of user demand for Internet access as a function of Quality of Service, pricing structure, and application) unassociated with individual users (utilizing anonymized user ID), with the collection engine (Abstract; section 2.2, third paragraph).

5. Claim 2 is rejected under 35 U.S.C. 103(a) as being unpatentable over Rupp in view of Gabber and Carr as applied to claim 1 above, and further in view of Astrom et al. (6,134,441). Rupp, Gabber and Carr do not disclose that the identifier representing the user is an MSISDN. Astrom discloses that an MSISDN is a unique identifier (col. 1, lines 56-61). It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the combined method of Rupp, Gabber and Carr such that the obtained identifier is a MSISDN, as taught by Gabber, because it is a unique identifier representing a subscriber in GSM networks (col. 1, lines 56-61).

6. Claims 3 and 10-13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Rupp in view of Gabber and Carr as applied to claim 1 above, and further in view of Ball et al. (6,446,200).

Regarding claim 3, Rupp, Gabber and Carr do not disclose that the obtained identifier is a static IP address. Ball discloses that a static IP address is a unique identifier (col. 14, lines 3-8). It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the combined method of Rupp, Gabber and Carr such that the obtained identifier is a static IP address, as taught by Ball, because it is a unique identifier representing a network component (col. 14, lines 3-8).

Regarding claims 10, Rupp, Gabber and Carr in claim 1 do not disclose that the step of obtaining an identifier representing one or more users of a computer network includes: receiving packets sent by an authentication server and extracting an identifier from the received packets. Ball discloses a method for collecting data usage network comprising the steps of receiving packets sent by an authentication server and extracting an identifier from the received packets (see fig. 1 and col. 9, line 17). It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the combined method of Rupp, Gabber and Carr to include the steps of receiving packets sent by an authentication server and extracting an identifier from the received packets, as taught by Ball, so that data of various types and formats can be handled (col. 3, lines 32-35). Accordingly, the receiving and extracting are performed at the network service provider.



Regarding claims 11-12, they differ from claim 10 in that the authentication server is a RADIUS server and that the received packets are RADIUS packets. Ball further discloses that the authentication server is a RADIUS server and the received packets are RADIUS packets (see fig. 1). It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the method of claim 10 such that the authentication server is a RADIUS server and the received packets are RADIUS packets, as taught by Ball, because RADIUS is a well-accepted standard in the industry and is used across a number of different types of technologies (col. 3, lines 48-51).

Regarding claim 13, Rupp, Gabber and Carr do not disclose that the authentication server is a DHCP server. Ball discloses that the authentication server is a DHCP server (see fig. 1). It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the combined method of Rupp, Gabber and Carr such that that the authentication server is a DHCP server, as taught by Ball, so that data of various types and formats can be handled (col. 3, lines 32-35).

7. Claims 6-9 are rejected under 35 U.S.C. 103(a) as being unpatentable over Rupp in view of Gabber and Carr as applied to claim 5 above, and further in view of Schneier ("Applied Cryptography").

Regarding claim 6, Rupp, Gabber and Carr do not disclose that the one-way hashing function is the SHA. Schneier discloses that SHA is a one-way hashing function (section 18.7, page 442). It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the combined method of Rupp, Gabber and Carr such that the one-way hashing function is the SHA, as taught by Schneier, because the algorithm is used in the Secure Hash Standard and is required for Federal applications not requiring a digital signature (section 18.7, page 442):

Regarding claim 7, Rupp, Gabber and Carr do not disclose that the one-way hashing function is the MD4 algorithm. Schneier discloses that the MD4 algorithm is a one-way hashing function (section 18.4, page 436). It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the combined method of Rupp, Gabber and Carr such that the one-way hashing function is the MD4 algorithm, as taught by Schneier, for better performance and simplicity (section 18.4, page 436).

Regarding claim 8, Rupp, Gabber and Carr do not disclose that the one-way hashing function is the MD5 algorithm. Schneier discloses that the MD5 algorithm is a one-way hashing function (section 18.5, page 436). It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the combined method of Rupp, Gabber and Carr such that the one-way hashing function is the MD5 algorithm, as taught

by Schneier, because it is an improved version of MD4 (section 18.5, page 436).

Regarding claim 9, Rupp, Gabber and Carr do not disclose that the one-way hashing function is the DES algorithm. Schneier discloses that the DES algorithm can be used as a one-way hashing function (section 18.11, pages 446-447). It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the combined method of Rupp, Gabber and Carr such that the one-way hashing function is the DES algorithm, as taught by Schneier. The motivation for doing so would have been to use a symmetric block cipher algorithm as an alternative to other one-way hash functions (section 18.11, page 446).

8. Claim 30 is rejected under 35 U.S.C. 103(a) as being unpatentable over Rupp in view of Gabber and Carr as applied to claim 28 above, and further in view of Schweitzer et al. (6,947,984). Rupp discloses multiple collection engines (i.e., a set of billing gateways) (fig. 1; section 2.1). Rupp does not disclose utilizing an aggregation server to configure and manage said multiple collection engines and aggregate collected data. Schweitzer discloses utilizing a central event manager (CEM) to configure and manage multiple collection engines (i.e., gatherers) and aggregate collected data, the CEM being functionally equivalent to the claimed aggregation server

(Abstract; fig. 1, elements 170, 161-165, 175; col. 6, lines 24-31; col. 7, line 51 - col. 8, line 9). It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the combined method of Rupp, Gabber and Carr to utilizing a CEM, which reads on an aggregation server, to configure and manage said multiple collection engines and aggregate collected data, as taught by Schweitzer. The motivation for doing so would have been to provide centralized, efficient management and controls of the collection engines (col. 7, lines 52-54).

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Minh Dinh whose telephone number is 571-272-3802. The examiner can normally be reached on Mon-Fri: 10:00am-6:30pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Gilberto Barron can be reached on 571-272-3799. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/MD/  
Minh Dinh  
Examiner  
Art Unit 2132

01/03/08

  
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SUPERVISORY PATENT EXAMINER